

Before the
FEDERAL COMMUNICATIONS COMMISSION
Washington, D. C. 20554

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FEDERAL COMMUNICATIONS COMMISSION
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In the Matter of:

Administration of the North
American Numbering Plan

CC Docket No. 92-237

COMMENTS
OF THE
UNITED STATES TELEPHONE ASSOCIATION

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TABLE OF CONTENTS

	<u>Page</u>
Summary	i
I. INTRODUCTION	1
II. PHASE ONE: OVERALL ADMINISTRATION OF THE NANP . .	2
A. NANP Administration	2
1. An Industry Group as NANP Administrator .	4
2. A Governmental Group as NANP Administrator	5
3. An Independent NANP Administrator	6
4. NANP Administration at Bellcore	6
B. Costs and Benefits of an Internationally Integrated Numbering Plan and Integrated Centralized Administration	9
III. PHASE TWO: FEATURE GROUP D ACCESS CODES	10
IV. OTHER ISSUES	13
A. PCS Numbering	13
B. Local Number Portability	14
C. Other Issues	14
V. CONCLUSION	15

SUMMARY

In order to address the issue of NANP administration, USTA developed the following mission statement: to ensure the continued availability of numbering resources and the logical evolution of numbering capabilities to support the telecommunications industry. USTA also developed a list of attributes that the NANP administrator must possess. Based on these, USTA examines a number of alternatives regarding NANP administration.

USTA supports the continuation of the current internationally integrated numbering plan and the integrated, centralized administration of that plan.

USTA describes the potential impact of and the costs of expanding FGD CIC to four digits. A conservative estimate of the switching related costs for the exchange carrier industry puts the cost in the billions of dollars. However, the industry has spent considerable time and resources to determine how to deal with the forecasted depletion of CICs. Many companies have already expended significant amounts to begin implementation of the four digit code. Exchange carriers should not be forced to incur the costs of CIC expansion if the demand does not exist and should be permitted sufficient time to implement when necessary. If the Commission decides to modify CIC expansion, it must do so as soon as possible.

Regarding the other issues listed by the Commission, USTA believes that the numbering plan for any new technologies and resulting new services should be part of the NANP. USTA explains that the feasibility of local number portability is limited in today's network. USTA urges the Commission to reexamine the issue of classifying numbering costs as exogenous for price cap purposes.

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COMMENTS
OF THE
UNITED STATES TELEPHONE ASSOCIATION

The United States Telephone Association (USTA) respectfully submits its comments in the above-referenced proceeding. USTA is the principal trade association of the exchange carrier industry. Its members provide over 98 percent of the exchange carrier-provided access lines in the U. S. Its members are also relied upon by the public to help assure that the North American Numbering Plan (NANP) operates in a constructive manner for carriers, users of the carriers' networks and the overall public interest.

I. INTRODUCTION.

The Commission issued a Notice of Inquiry (Notice) on October 29, 1992 to explore several long range issues related to the administration of the NANP. While no immediate regulatory actions are contemplated, the Commission intends to use the information gathered here in other proceedings and activities. Certainly pursuit of any of these issues should focus on ensuring that customers have available to them a cost-effective plan that balances fundamental ease of use with an evolving capability to

accommodate specialized uses and users. The continued viability of the NANP and its capability to accommodate the needs of carriers and users is and must remain a core concern. A numbering plan is without value if it cannot be understood and efficiently utilized by customers. USTA's comments will address the issues raised by the Commission in a manner which will provide the Commission with the opportunity to further these principles.

II. PHASE ONE: OVERALL ADMINISTRATION OF THE NANP

A. NANP Administration.

The Commission requests comment on who should administer the NANP and how administration could be improved. In order to make such a determination, the Commission should consider what should be the mission of the NANP and what attributes should the administrator possess in order to carry out that mission.

USTA developed the following mission statement to govern the administration of the NANP: to ensure the continued availability of numbering resources and the logical evolution of numbering capabilities to support the telecommunications industry. Whoever has responsibility for the NANP must understand the import of the mission. NANP administration includes many daily activities which are necessary to meet current needs for numbering resources. However, the larger focus of NANP administration must remain on the future by providing effective leadership and

management to ensure that numbering resources are available to meet the long term needs of the telecommunications industry.

In order to accomplish the mission defined above, the NANP administrator must possess certain attributes or characteristics. The following are, in order of priority, the primary attributes identified by USTA as essential to successful administration of the NANP. Accordingly, the NANP administrator should:

1. Have the capability to provide impartial and effective planning, management and leadership for the telecommunications industry in World Zone 1 on numbering issues. This will require access to technical subject matter experts, including Bellcore and other recognized industry organizations;
2. Solicit and be responsive to industry input and oversight;
3. Possess a working relationship with the Commission as well as with Canadian and Caribbean authorities, domestic and international standards organizations and other relevant agencies and departments, for example, the Department of State;
4. Have experience in telecommunications, particularly with regard to number resource use and allocation; and,
5. Have sufficient revenues and staff (funding should be required of all resource users);

The NANP administrator should have open processes intended to assure that informed decisions on the handling of NANP number resources are made on the basis of objective input and criteria and are communicated in a timely way to those who are affected. Keeping in mind the mission statement and the listing of essential attributes, a number of alternatives regarding NANP

administration should be evaluated before the advisability of transferring NANP administration to an administrator other than Bellcore can be determined. Among the alternatives examined on a preliminary basis by USTA are the current administrator, the current administrator with some modifications, an existing telecommunications organization, a regulatory body, and a new independent entity. None of the possible alternatives or modifications discussed herein will guarantee that the decisions of the NANP administrator will meet with unanimous approval and support within World Zone 1.

1. An Industry Group as NANP Administrator. USTA considered whether NANP administration could be assumed by an existing telecommunications industry group, such as USTA, the National Exchange Carrier Association or the Cellular Telecommunications Industry Association. However, USTA was able to identify several disadvantages to this approach. For example, the ability to provide planning and leadership on numbering issues would be driven by the membership which could limit industry input and oversight and hinder impartiality. For some organizations, administration of the NANP might be inconsistent with its charter, particularly if it would involve NANP administration for competitors of members. Entities which are not members may be less likely to accept the organization's authority. Such groups may not have established relationships with Canadian and Caribbean telecommunications agencies or with

international standards bodies. Finally, such groups may not be able to focus the adequate amount of time or resources on numbering issues. Non-members would need assurances that any NANP administration funding provided would not subsidize other activities, while dues paying members would not want dues to be diverted.

2. A Governmental Group as NANP Administrator. The disadvantages of placing NANP administration under the jurisdiction of the Commission or a joint U.S./Canadian/Caribbean regulatory body would also outweigh any advantages. The Commission must comply with the Administrative Procedures Act. This sets a different standard for action. It could require that numbering decisions would be subject to a notice and comment cycle or to an administrative hearing. This certainly would result in a much slower response time on industry numbering issues. The Commission is not familiar with the daily administrative tasks necessary to maintain the NANP. It is doubtful that the Commission has or could receive the necessary funding and staff to meet this need. Access to technical experts would also be limited by administrative requirements. Political and internal organizational considerations could affect numbering decisions.

The remaining alternatives show greater promise and merit further consideration.

3. An Independent NANP Administrator. As a qualified, independent entity, the NANP administration would be its own organization, separate from any other telecommunications organization. An independent body would have no perceived bias for or against any group. It could provide the planning and leadership needed to address and resolve numbering issues, provided that qualified staff and sufficient funding are obtained. Details on how such an organization could be created would have to be resolved by the appropriate authorities within World Zone 1. In addition, its authority and accountability would have to be specified. However, such issues could be handled by an industry advisory board which could be maintained to provide oversight and ensure industry input. An advisory board could provide a forum for discussion of numbering issues by the industry. Consensus within the board could provide direction to the NANP administrator. An advisory board would also reduce the need for expanded Commission oversight of NANP administration and would ensure that NANP administration remains a function of the telecommunications industry. The composition of the board and its authority and accountability would have to be carefully determined to ensure its effectiveness.

4. NANP Administration at Bellcore. Responsibility for the NANP could remain at Bellcore, thereby avoiding any change in the current NANP administration. Since it assumed responsibility for the NANP in 1984, the current administrator certainly has a

wealth of experience in number resource allocation. Its duties have included both the current handling of the NANP and future-oriented NANP planning. It has established relationships with both Canadian and Caribbean telecommunications entities and participates in established standards bodies. To date, the current administrator has sought to administer the NANP in a constructive and careful manner. In many respects the wide range of numbering issues fielded by the current administrator and its ability to work efficiently with unusual time constraints merit its continuing contribution.

An industry advisory board could be created to oversee the activities of the current NANP administrator. As noted above, such a board could provide additional industry input into the current process without sacrificing the experience and relationships of the current administrator. This would avoid a major change in administration while changes to the NANP are implemented. It would not be a governing board, but would offer input from various parts of the industry. However, such a board may not be possible within the current Bellcore structure and funding would continue to be a matter of concern.

Currently, NANP administration is funded solely by the seven RBOCs and two independent telephone companies. Concerns have arisen regarding the ability of the current administrator to remain impartial. Any efforts to avoid the appearance of bias

may affect the NANP administrator's ability to provide the leadership and planning which are required on critical numbering issues. The Commission could consider modifications to the current process, if deemed necessary or advisable, to counter these concerns. Such modifications could include requiring all users to contribute to the funding of the NANP administration. Fairly apportioning funding, coupled with a policy against any disproportionate funding role for any carrier or group of carriers, could alleviate some of the concerns regarding possible bias.

Another possible modification could be to require the current administrator to formalize its decision-making process and to implement procedures to solicit greater industry input into that process.

The Commission itself suggests yet another modification to the current process wherein formal structural separation would be applied between NANP administration and Bellcore. USTA does not believe that formal structural separation is necessary. The Commission itself has rejected structural separation in favor of nonstructural safeguards. Nonstructural safeguards, to the extent necessary to identify and separate costs, may provide a more economic and efficient means of separating NANP administration from other Bellcore operations.

However the issue of who should administer the NANP is ultimately decided, USTA urges the Commission not to make any change in administration until after 1995. Current implementation activities regarding carrier identification code (CIC) expansion and interchangeable numbering plan area (NPA) codes could be affected by any change ordered by the Commission. This could lead to the development of new or peripheral problems. The public interest would best be served by allowing these activities to proceed as planned without unnecessary interference, whether intended or not.

B. Costs and Benefits of an Internationally Integrated Numbering Plan and Integrated Centralized Administration.

USTA strongly supports the continuation of the current internationally integrated numbering plan and the integrated, centralized administration of that plan. The current plan serves the public interest by not requiring international dialing between countries in World Zone 1 where there is a community of interest. Thus, customers benefit by being able to call any telephone in the eighteen countries in World Zone 1 by dialing a ten digit number. Technically, because fewer digits are dialed, received, processed and transmitted, fewer network resources are required to support the integrated plan. Dissolution of the integrated plan would force carriers to make costly changes to every switch in World Zone 1. Centralized administration is required to ensure that the integrated plan operates efficiently.

Certainly the benefits of an integrated plan outweigh its costs and the costs to discontinue it. USTA believes that the integrated plan with centralized administration should be continued.

III. PHASE 2: FEATURE GROUP D ACCESS CODES

The Commission requests comments regarding the expansion of Feature Group D (FGD) CICs to four digits scheduled to be implemented in 1995. The Commission acknowledges that implementation will require customers to dial more digits, will require carriers to educate their customers and will be technically difficult and expensive. Specifically, the Commission is seeking information on the costs, benefits and technical issues associated with FGD CIC expansion, any alternative technical approaches and what rules should govern FGD codes if the current codes are not expanded.

FGD CIC expansion will impact all areas of the exchange carrier network provision of equal access, including switching systems, database systems, operator services systems, signaling systems, billing systems and operational support systems. Software changes will be required in every switch and hardware changes will be required in many. Some of the switches which currently provide equal access will require only modest upgrades. However, others will require extensive modifications. Some vendors have not provided information on whether their switches

can be modified to process a four digit CIC. In a number of cases, the switch may have to be replaced. Translation changes will be required for every subscriber line and every access trunk group. Support systems used to process access service requests and the carrier access billing system will require upgrades.

It would be difficult to quantify the implementation costs of CIC expansion on an industry-wide basis. The costs for each switch will vary depending upon the work which must be done, the vendor and the company involved. However, a perspective on the magnitude of the costs involved can be understood based on the description of possible changes provided above. There are approximately 20,000 switches in the local exchange carrier public switched networks. Approximately 1,350 exchange carriers provide FGD access through 14,000 switches. The number of FGD switches may be higher by 1995, although the additional costs of providing the four digit code could slow implementation of equal access by independent telephone companies. Even a conservative estimate of the switching related costs for the exchange carrier industry will put the cost in the billions of dollars. While it may be possible to develop a phase-in approach to spread out the costs for the switching systems, the operational support systems will have to be modified to support the first capable switch.

Expansion of CICs is viewed as necessary to accommodate new access customers. Competition has increased the demand for these

codes. Virtually all available codes have been assigned. Other technical alternatives, such as sectorization, were considered and rejected. In fact, the industry has spent considerable time and effort through the Industry Carriers Compatibility Forum, the Network Operations Forum and the Ordering and Billing Forum, to determine how to deal with the forecasted depletion of CICs and has already expended significant amounts to begin implementation of the four digit code. No other technical alternative has been identified. With the current three digit code, 1,000 providers can be accommodated. Unless the Commission determines that access must be limited to 1,000 providers, the only remaining alternative is to expand the CICs to four digits. In addition, the Commission should also address the issue of dialing parity between existing (10XXX) CIC users and future (101XXXX) CIC users.

Flash-cut implementation to four digit FGD CICs is not feasible, based on the costs and technical issues discussed above, and in some areas may not be necessary. The only way to alleviate the cost burdens which implementation will demand would be to allow exchange carriers sufficient time to implement CIC expansion. Expenditure of the costs as described above should be based on an individual company assessment of whether the market requires the implementation of a four digit FGD code. If the market is found to exist, exchange carriers should be permitted sufficient time to make the necessary changes. Independent

exchange carriers are provided an opportunity to seek waiver of the Commission's rules if economic and/or technical constraints prevent them from complying with a bona fide request for equal access. While such opportunities should be continued, USTA suggests that they be extended to all exchange carriers. Exchange carriers should not be forced to incur the costs of CIC expansion if the demand does not exist and should be permitted sufficient time to implement when necessary. In any case in which an exchange carrier must upgrade its switch or software, it must be permitted to recover its costs in rates.

As noted above, many exchange carriers have started to take the steps necessary to implement CIC expansion. Budgets and planning processes have already been established in many cases. If the Commission decides to modify how the industry is proceeding with CIC expansion, it must make such a decision as soon as possible so that exchange carriers will have time to respond and to make any required changes.

IV. OTHER ISSUES.

A. PCS Numbering.

USTA incorporates by reference its comments filed in GEN Docket No. 90-314 regarding PCS. USTA believes that the numbering plan for any new technologies and resulting new services should be part of the NANP. As stated above, an integrated numbering plan which supports different networks and

services will benefit customers. The ultimate objective of non-geographic numbering resources dedicated to PCS should be to support non-carrier specific number portability. PCS will place even greater demands on numbering resources. Industry forums and national and international standards organizations are already addressing the issue of PCS numbering. These groups should be encouraged to continue their efforts.

B. Local Number Portability.

The feasibility of local number portability in today's network is limited. A fundamental structural element of the entire telecommunications industry is the geographically-based NANP number. To make a local number portable, whereby a customer can use a number regardless of the service provider, routing and rating systems would have to be altered. Operational support systems will also be impacted. Local number portability breaks the link between the number and the location of the end office. Affected operations functions will have to be modified. Deployment of the Advanced Intelligent Network as well as SS7 capabilities on an industry-wide basis would probably be required before local number portability could be implemented.

C. Other Issues.

USTA agrees that the Commission need not consider the other issues listed in the Notice in this proceeding. However, the issue of classifying certain numbering costs as exogenous for

purposes of price cap regulation must be reexamined. Exogenous treatment is merited for numbering costs which result from actions taken by administrative, judicial or legislative means beyond the control of the carriers. Any changes in numbering contemplated by the Commission should include consideration of how the costs of implementing the changes will be recovered.

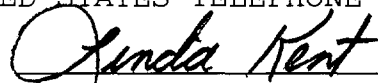
V. CONCLUSION.

USTA urges the Commission to consider the mission and attributes for NANP administration described herein, as well as the alternatives which USTA analyzed, if further action is taken to alter the current NANP administration. Any changes which the Commission may consider regarding CIC expansion must be identified and articulated as soon as possible.

Respectfully submitted,

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